- (2) INFORMATION FOR SEQUENCE ID NO: 2:
  - (i) SEQUENCE CHARACTERISTICS:
    - (A) LENGTH: 675 base pairs
    - (B) TYPE: nucleic acid
    - (D) TOPOLOGY: linear

TAG

- (ii) MOLECULE TYPE: genomic DNA
- (ix) SEQUENCE DESCRIPTION: SEQ ID NO: 2:

						CCA										48
met	ser	Asp	Asn	Lys 5	Lys	Pro	Asp	Lys	Ala 10	His	Ser	Gly	Ser	Gly 15	Gly	
GAC	GGT	GAT	GGG	AAT	AGG	TGC	AAT	TTA		CAC	CGG	TAC	TCC		GAA	96
						Cys										,
			20			_		25				_	30			
						GGG										144
Glu	Ile	Leu 35	Pro	Tyr	Leu	Gly	Trp	Leu	Val	Phe	Ala	Val 45	Val	Thr	Thr	
AGT	ጥጥጥ		GCG	СТС	CAG	ATG		ልጥል	GAC	GCC	СТТ		GAG	GAG	CAG	192
Ser	Phe	Leu	Δla	Len	Gln	Met	Dhe	Tla	Acn	λla	Tou	TA1	Clu	Clu	Clo	172
DCI	50	Dea	AId	Dea	GIII		FIIE	116	ASP	AIG		TAT	GIU	GIU	GIII	
mam		3.00	CAM	cmc.	~~~	55 mag	3.003		100		60					
						TGG										240
Tyr 65	GIU	Arg	Asp	Val	A1a 70	Trp	IIe	Ala	Arg	Gln 75	Ser	Lys	Arg	Met	Ser 80	
TCT	GTC	GAT	GAG	GAT	GAA	GAC	GAT	GAG	GAT		GAG	GAT	GAC	TAC		288
						Asp										
GAC	CAC	CAC	CAC		CAC	GAC	CAM	CCC		mam	CAM	Cam	C3.C		C 3 m	226
																336
Asp	ASP	GIU		ASP	Asp	Asp	Asp		Pne	Tyr	Asp	Asp		Asp	Asp	
			100					105					110			
GAG	GAA	GAA	GAA	TTG	GAG	AAC	CTG	ATG	GAT	GAT	GAA	TCA	GAA	GAT	GAG	384
Glu	Glu	Glu	Glu	Leu	Glu	Asn	Leu	Met	Asp	Asp	Glu	Ser	Glu	Asp	Glu	
		115					120					125				
GCC	GAA	GAA	GAG	ATG	<b>AGC</b>	GTG	GAA	ATG	GGT	GCC	GGA	GCT	GAG	GAA	ATG	432
Ala	Glu	Glu	Glu	Met	Ser	Val	Glu	Met	Glv	Ala	Glv	Ala	Glu	Glu	Met	
	130					135			2		140					
GGT		GGC	GCT	AAC	тст	GCC	тст	CTT	ССТ	GGC		САТ	ጥጥል	AGG	AAC	480
						Ala										400
145		011		71011	150	niu	Cys	Vai	110	155	1113	1115	Dea	ALG	-	
	CAA	CTC	7 7 C	mcm		ATG	y mm	mam	mma		03.0	C3.0	OOM.	3 3 m	160	500
																528
ASII	GIU	vai	гуs	165	Arg	Met	TIE	Tyr	170	Pne	Hls	Asp	Pro	Asn 175	Phe	
CTG	GTG	TCT	ATA	CCA	GTG	AAC	CCT	AAG	GAA	CAA	ATG	GAG	TGT	AGG	TGT	576
						Asn										
			180					185					190	_	_	
						GTT										624
Glu	Asn		Asp	Glu	Glu	Val	Ala	Met	Glu	Glu	Glu	Glu	Glu	Glu	Glu	
		195					200				210					
GAG	GAG	GAG	GAG	GAA	GAG	GAA	ATG	GGA	AAC	CCG	GAT	GGC	TTC	TCA	CCT	672
Glu	Glu	Glu	Glu	Glu	Glu	Glu	Met	Gly	Asn	Pro	Asp	Gly	Phe	Ser	Pro	
220					225			-		230	-	•			235	
<b>m</b> = <i>c</i>																

675

(2)	INFORMATION	FOR	SEQUENCE	ID	NO:	3
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- (i) SEQUENCE CHARACTERISTICS:
  - (A) LENGTH: 228 base pairs
- (B) TYPE: nucleic acid
  (D) TOPOLOGY: linear
  (ii) MOLECULE TYPE: genomic DNA
  (ix) SEQUENCE DESCRIPTION: SEQ ID NO: 3:

GCATGCAGTT	GCAAAGCCCA	GAAGAAAGAA	ATGGACAGCG	GAAGAAGTGG	${f TTGTTTTTT}$	60
TTCCCCTTCA	TTAATTTTCT	AGTTTTTAGT	<b>AATCCAGAAA</b>	ATTTGATTTT	GTTCTAAAGT	120
TCATTATGCA	<b>AAGATGTCAC</b>	CAACAGACTT	CTGACTGCAT	GGTGAACTTT	CATATGATAC	180
ATAGGATTAC	ACTTGTACCT	GTTAAAAATA	AAAGTTTGAC	ТТССАТАС		228

- (2) INFORMATION FOR SEQUENCE ID NO: 4:
  - (i) SEQUENCE CHARACTERISTICS:
    - (A) LENGTH: 1365 base pairs

  - (B) TYPE: nucleic acid
    (D) TOPOLOGY: linear
    (ii) MOLECULE TYPE: genomic DNA
    (ix) SEQUENCE DESCRIPTION: SEQ ID NO: 4:

ACCACAGGAG AATGAAAAGA ACCCGGGACT CCCAAAGACG CTAGATG	TGT	50
GAAGATCCTG ATCACTCATT GGGTGTCTGA GTTCTGCGAT ATTCATC	CCT 1	00
CAGCCAATGA GCTTACTGTT CTCGTGGGGG GTTTGTGAGC CTTGGGT	AGG 1	50
AAGTTTTGCA AGTTCCGCCT ACAGCTCTAG CTTGTGAATT TGTACCC	TTT 2	00
CACGTAAAAA AGTAGTCCAG AGTTTACTAC ACCCTCCCTC CCCCCTC	CCA 2	50
CCTCGTGCTG TGCTGAGTTT AGAAGTCTTC CTTATAGAAG TCTTCCG	TAT 3	00
AGAACTCTTC CGGAGGAAGG AGGGAGGACC CCCCCCTTT GCTCTCC	CAG 3	50
CATGCATTGT GTCAACGCCA TTGCACTGAG CTGGTCGAAG AAGTAAG	CCG 4	00
CTAGCTTGCG ACTCTACTCT TATCTTAACT TAGCTCGGCT TCCTGCT	GGT 4	50
ACCCTTTGTG CC	4	62
ATG TCT GAT AAC AAG AAA CCA GAC AAA GCC CAC AGT GGC	TCA 5	04
GGT GGT GAC GGT GAT GGG AAT AGG TGC AAT TTA TTG CAC	CGG 5	46
TAC TCC CTG GAA GAA ATT CTG CCT TAT CTA GGG TGG CTG	GTC 5	88
TTC GCT GTT GTC ACA ACA AGT TTT CTG GCG CTC CAG ATG	TTC 6	30
ATA GAC GCC CTT TAT GAG GAG CAG TAT GAA AGG GAT GTG	GCC 6	72
TGG ATA GCC AGG CAA AGC AAG CGC ATG TCC TCT GTC GAT	GAG 7	14
GAT GAA GAC GAT GAG GAT GAG GAT GAC TAC TAC GAC	GAC 7	56
GAG GAC GAC GAC GAT GCC TTC TAT GAT GAT GAG GAT	GAT 7	98
GAG GAA GAA TTG GAG AAC CTG ATG GAT GAA TCA	GAA 8	40
GAT GAG GCC GAA GAA GAG ATG AGC GTG GAA ATG GGT GCC	GGA 8	82
GCT GAG GAA ATG GGT GCT GGC GCT AAC TGT GCC TGT GTT	CCT 9	24
GGC CAT CAT TTA AGG AAG AAT GAA GTG AAG TGT AGG ATG	ATT 9	66
TAT TTC TTC CAC GAC CCT AAT TTC CTG GTG TCT ATA CCA	GTG 10	80
AAC CCT AAG GAA CAA ATG GAG TGT AGG TGT GAA AAT GCT	GAT 10	50
GAA GAG GTT GCA ATG GAA GAG GAA GAA GAA GAG GAG	GAG 10	92
GAG GAG GAA GAG GAA ATG GGA AAC CCG GAT GGC TTC TCA	CCT 11	34
TAG	11	37
GCATGCAGTT GCAAAGCCCA GAAGAAGAA ATGGACAGCG GAAGAAG	TGG 11	87
TTGTTTTTT TTCCCCTTCA TTAATTTTCT AGTTTTTAGT AATCCAG	AAA 12	37
ATTTGATTTT GTTCTAAAGT TCATTATGCA AAGATGTCAC CAACAGA	CTT 12	87
CTGACTGCAT GGTGAACTTT CATATGATAC ATAGGATTAC ACTTGTA	CCT 13	37
GTTAAAAATA AAAGTTTGAC TTGCATAC	13	65

- (2) INFORMATION FOR SEQUENCE ID NO: 5:
  - (i) SEQUENCE CHARACTERISTICS:

  - (A) LENGTH: 4698 base pairs
    (B) TYPE: nucleic acid
    (D) TOPOLOGY: linear
    (ii) MOLECULE TYPE: genomic DNA
    (ix) SEQUENCE DESCRIPTION: SEQ ID NO: 5:

ACCACAGGAG AATGAAAAGA ACCCGGGACT CCCAAAGACG	CTACATCTCT	50
GAAGATCCTG ATCACTCATT GGGTGTCTGA GTTCTGCGAT		
CAGCCAATGA GCTTACTGTT CTCGTGGGGG GTTTGTGAGC		100
		150
AAGTTTTGCA AGTTCCGCCT ACAGCTCTAG CTTGTGAATT		200
CACGTAAAAA AGTAGTCCAG AGTTTACTAC ACCCTCCCTC		250
CCTCGTGCTG TGCTGAGTTT AGAAGTCTTC CTTATAGAAG		300
AGAACTCTTC CGGAGGAAGG AGGGAGGACC CCCCCCTTT		350
CATGCATTGT GTCAACGCCA TTGCACTGAG CTGGTCGAAG		400
CTAGCTTGCG ACTCTACTCT TATCTTAACT TAGCTCGGCT	TCCTGCTGGT	450
ACCCTTTGTG CC		462
ATG TCT GAT AAC AAG AAA CCA GAC AAA GCC CAC		504
GGT GGT GAC GGT GAT GGG AAT AGG TGC AAT TTA		546
TAC TCC CTG GAA GAA ATT CTG CCT TAT CTA GGG		588
TTC GCT GTT GTC ACA ACA AGT TTT CTG GCG CTC		630
	GAT GTG GCC	672
TGG ATA GCC AGG CAA AGC AAG CGC ATG TCC TCT		714
GAT GAA GAC GAT GAG GAT GAC TAC	TAC GAC GAC	756
GAG GAC GAC GAC GAT GCC TTC TAT GAT GAT	GAG GAT GAT	798
GAG GAA GAA TTG GAG AAC CTG ATG GAT GAT		840
GAT GAG GCC GAA GAA GAG ATG AGC GTG GAA ATG		882
GCT GAG GAA ATG GGT GCT GGC GCT AAC TGT GCC	T	916
GTGAGTAACC CGTGGTCTTT ACTCTAGATT CAGGTGGGGT	GCATTCTTTA	966
CTCTTGCCCA CATCTGTAGT AAAGACCACA TTTTGGTTGG	GGGTCATTGC	1016
TGGAGCCATT CCTGGCTCTC CTGTCCACGC CTATCCCCGC	TCCTCCCATC	1066
CCCCACTCCT TGCTCCGCTC TCTTTCCTTT TCCCACCTTG	CCTCTGGAGC	1116
TTCAGTCCAT CCTGCTCTGC TCCCTTTCCC CTTTGCTCTC		1166
TCCCCCTCGG CTCAACTTTT CGTGCCTTCT GCTCTCTGAT		1216
TTCAGGCTTC CCCATTTGCT CCTCTCCCGA AACCCTCCCC		1266
CCTTTTCGCG CCTTTTCTTT CCTGCTCCCC TCCCCCTCCC		1316
TCACCAGCTT TGCTCTCCCT GCTCCCCTCC CCCTTTTGCA		1366
TCCTGCTCCC CTCCCCTCC CCTCCCTGTT TACCCTTCAC		1416
CTACCTGCTT CCCTCCCCT TGCTGCTCCC TCCCTATTTG		1466
TGCTCCTCCC TCCCCTCCC CCTCCCTCCC TATTTGCATT		1516
CCTCCCTCCC CCTCCCCAGG CCTTTTTTTT TTTTTTTTTT		1566
	GTCCTGGCAC	1616
TCACTCTGTA GACCAGGCTG GCCTCAAACT CAGAAATCTG		1666
CCTCCCAAAT GCTGGGATTA AAGGCTTGCA CCAGGACTGC		1716
GCCTTTCTTT TTTCTCCTCT CTGGTCTCCC TAATCCCTTT		1766
AACTCCCCTT TTGGCACCTT TCCTTTACAG GACCCCCTCC		1816
TTCCCTTCCG GCACCCTTCC TAGCCCTGCT CTGTTCCCTC		1866
CCTCCCCTC TTTGCTCGAC TTTTAGCAGC CTTACCTCTC		1916
GCCCGTTCC CCTTTTTTGT GCCTTTCCTC CTGGCTCCCC		1966
	ICCACCITCC	1300

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AGCTCACCTT TTTGTTTGTT TGGTTGTTTG GTTGTTTGGT TTGCTTTTTT
                                                               2016
TTTTTTTTT GCACCTTGTT TTCCAAGATC CCCCTCCCCC TCCGGCTTCC
                                                               2066
2116
TCTGCCTTTC CTGTCCCTGC TCCCTTCTCT GCTAACCTTT TAATGCCTTT
                                                               2166
CTTTTCTAGA CTCCCCCCTC CAGGCTTGCT GTTTGCTTCT GTGCACTTTT
CCTGACCCTG CTCCCCTTCC CCTCCCAGCT CCCCCCTCTT TTCCCACCTC
                                                               2266
CCTTTCTCCA GCCTGTCACC CCTCCTTCTC TCCTCTGT TTCTCCCACT
                                                               2316
TCCTGCTTCC TTTACCCCTT CCCTCTCCT ACTCTCCTCC CTGCCTGCTG
                                                               2366
GACTTCCTCT CCAGCCGCC AGTTCCCTGC AGTCCTGGAG TCTTTCCTGC
                                                               2416
CTCTCTGTCC ATCACTTCCC CCTAGTTTCA CTTCCCTTTC ACTCTCCCT
                                                               2466
ATGTGTCTCT CTTCCTATCT ATCCCTTCCT TTCTGTCCCC TCTCCTCTGT
                                                               2516
CCATCACCTC TCTCCTCCT TCCCTTTCCT CTCTCTTCCA TTTTCTTCCA
CCTGCTTCTT TACCCTGCCT CTCCCATTGC CCTCTTACCT TTATGCCCAT
TCCATGTCCC CTCTCAATTC CCTGTCCCAT TGTGCTCCCT CACATCTTCC
                                                               2616
                                                               2666
ATTTCCCTCT TTCTCCCTTA GCCTCTTCTT CCTCTTCTCT TGTATCTCCC
                                                              2716
TTCCCTTTGC TTCTCCCTCC TCCTTTCCCC TTCCCCTATG CCCTCTACTC
                                                              2766
TACTTGATCT TCTCTCCTCT CCACATACCC TTTTTCCTTT CCACCCTGCC
                                                               2816
CTTTGTCCCC AGACCCTACA GTATCCTGTG CACAGGAAGT GGGAGGTGCC
                                                               2866
ATCAACAACA AGGAGGCAAG AAACAGAGCA AAATCCCAAA ATCAGCAGGA
                                                               2916
AAGGCTGGAT GAAAATAAGG CCAGGTTCTG AGGACAGCTG GAATCTAGCC
AAGTGGCTCC TATAACCCTA AGTACCAAGG GAGAAAGTGA TGGTGAAGTT
                                                               2966
                                                               3016
CTTGATCCTT GCTGCTTCTT TTACATATGT TGGCACATCT TTCTCAAATG
                                                              3066
CAGGCCATGC TCCATGCTTG GCGCTTGCTC AGCGTGGTTA AGTAATGGGA
GAATCTGAAA ACTAGGGGCC AGTGGTTTGT TTTGGGGACA AATTAGCACG
                                                              3166
TAGTGATATT TCCCCCTAAA AATTATAACA AACAGATTCA TGATTTGAGA
                                                               3216
TCCTTCTACA GGTGAGAAGT GGAAAAATTG TCACTATGAA GTTCTTTTTA
                                                               3266
GGCTAAAGAT ACTTGGAACC ATAGAAGCGT TGTTAAAATA CTGCTTTCTT
                                                              3316
TTGCTAAAAT ATTCTTTCTC ACATATTCAT ATTCTCCAG
                                                               3355
GT GTT CCT GGC CAT CAT TTA AGG AAG AAT GAA GTG AAG TGT 3396
AGG ATG ATT TAT TTC TTC CAC GAC CCT AAT TTC CTG GTG TCT
ATA CCA GTG AAC CCT AAG GAA CAA ATG GAG TGT AGG TGT GAA
                                                              3480
AAT GCT GAT GAA GAG GTT GCA ATG GAA GAG GAA GAA GAA
                                                               3522
GAG GAG GAG GAA GAG GAA ATG GGA AAC CCG GAT GGC
                                                               3564
TTC TCA CCT TAG
                                                               3576
GCATGCAGGT ACTGGCTTCA CTAACCAACC ATTCCTAACA TATGCCTGTA
                                                               3626
GCTAAGAGCA TCTTTTTAAA AAATATTATT GGTAAACTAA ACAATTGTTA
                                                               3676
TCTTTTTACA TTAATAAGTA TTAAATTAAT CCAGTATACA GTTTTAAGAA
                                                               3726
CCCTAAGTTA AACAGAAGTC AATGATGTCT AGATGCCTGT TCTTTAGATT
                                                               3776
GTAGTGAGAC TACTTACTAC AGATGAGAAG TTGTTAGACT CGGGAGTAGA
                                                               3826
GACCAGTAAA AGATCATGCA GTGAAATGTG GCCATGGAAA TCGCATATTG
                                                               3876
TTCTTATAGT ACCTTTGAGA CAGCTGATAA CAGCTGACAA AAATAAGTGT
TTCAAGAAAG ATCACACGCC ATGGTTCACA TGCAAATTAT TATTTTGTCG
                                                               3926
                                                               3976
TTCTGATTTT TTTCATTTCT AGACCTGTGG TTTTAAAGAG ATGAAAATCT
                                                              4026
CTTAAAATTT CCTTCATCTT TAATTTTCCT TAACTTTAGT TTTTTTCACT
                                                              4076
TAGAATTCAA TTCAAATTCT TAATTCAATC TTAATTTTTA GATTTCTTAA
                                                              4126
AATGTTTTT AAAAAAATG CAAATCTCAT TTTTAAGAGA TGAAAGCAGA
                                                               4176
GTAACTGGGG GGCTTAGGGA ATCTGTAGGG TTGCGGTATA GCAATAGGGA
                                                              4226
GTTCTGGTCT CTGAGAAGCA GTCAGAGAGA ATGGAAAACC AGGCCCTTGC CAGTAGGTTA GTGAGGTTGA TATGATCAGA TTATGGACAC TCTCCAAATC ATAAATACTC TAACAGCTAA GGATCTCTGA GGGAAACACA ACAGGGAAAT
                                                              4276
                                                              4326
                                                              4376
ATTTTAGTTT CTCCTTGAGA AACAATGACA AGACATAAAA TTGGCAAGAA
                                                              4426
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AGTCAGGAGT	GTATTCTAAT	AAGTGTTGCT	TATCTCTTAT	TTTCTTCTAC	4476
AGTTGCAAAG	CCCAGAAGAA	AGAAATGGAC	<b>AGCGGAAGAA</b>	GTGGTTGTTT	4526
TTTTTTCCCC	TTCATTAATT	TTCTAGTTTT	TAGTAATCCA	GAAAATTTGA	4576
TTTTGTTCTA	<b>AAGTTCATTA</b>	TGCAAAGATG	TCACCAACAG	ACTTCTGACT	4626
GCATGGTGAA	CTTTCATATG	<b>ATACATAGGA</b>	TTACACTTGT	ACCTGTTAAA	4676
AATAAAAGTT	TGACTTGCAT	AC			4698

- (2) INFORMATION FOR SEQUENCE ID NO: 6:
  - (i) SEQUENCE CHARACTERISTICS:
    - (A) LENGTH: 25 amino acids
    - (B) TYPE: amino acid
  - (D) TOPOLOGY: linear (ii) MOLECULE TYPE: protein
  - (ix) SEQUENCE DESCRIPTION: SEQ ID NO: 6:

Leu Leu His Arg Tyr Ser Leu Glu Glu Ile Leu Pro Tyr Leu Gly Trp 10 Val Phe Ala Val Val Thr Thr Ser Phe 20

- (2) INFORMATION FOR SEQUENCE ID NO: 7:
  - (i) SEQUENCE CHARACTERISTICS:

  - (A) LENGTH: 2418 base pairs
    (B) TYPE: nucleic acid
    (D) TOPOLOGY: linear
    (ii) MOLECULE TYPE: genomic DNA
    (ix) SEQUENCE DESCRIPTION: SEQ ID NO: 7:

GGATCCAGGC	CCTGCCAGGA	<b>AAAATATAAG</b>	GGCCCTGCGT	GAGAACAGAG	50
GGGGTCATCC	ACTGCATGAG	AGTGGGGATG	TCACAGAGTC	CAGCCCACCC	100
TCCTGGTAGC	ACTGAGAAGC	CAGGGCTGTG		GCACCCTGAG	150
GGCCCGTGGA	TTCCTCTTCC		GGAACCAGGC	AGTGAGGCCT	200
	CAGTATCCTC	AGGTCACAGA	GCAGAGGATG	CACAGGGTGT	250
GCCAGCAGTG	<b>AATGTTTGCC</b>	CTGAATGCAC	ACCAAGGGCC	CCACCTGCCA	300
CAGGACACAT	AGGACTCCAC	AGAGTCTGGC	CTCACCTCCC	TACTGTCAGT	350
CCTGTAGAAT	CGACCTCTGC	TGGCCGGCTG	TACCCTGAGT	ACCCTCTCAC	400
TTCCTCCTTC	AGGTTTTCAG	GGGACAGGCC	<b>AACCCAGAGG</b>	ACAGGATTCC	450
CTGGAGGCCA	CAGAGGAGCA	CCAAGGAGAA	GATCTGTAAG	TAGGCCTTTG	500
TTAGAGTCTC	CAAGGTTCAG	TTCTCAGCTG	AGGCCTCTCA	CACACTCCCT	550
CTCTCCCCAG	GCCTGTGGGT	CTTCATTGCC	CAGCTCCTGC	CCACACTCCT	600
GCCTGCTGCC	CTGACGAGAG	TCATCATGTC	TCTTGAGCAG	AGGAGTCTGC	650
ACTGCAAGCC	TGAGGAAGCC	CTTGAGGCCC	<b>AACAAGAGGC</b>	CCTGGGCCTG	700
GTGTGTGTGC	AGGCTGCCAC	CTCCTCCTCC	TCTCCTCTGG	TCCTGGGCAC	750
CCTGGAGGAG	GTGCCCACTG	CTGGGTCAAC	AGATCCTCCC	CAGAGTCCTC	800
AGGGAGCCTC	CGCCTTTCCC	ACTACCATCA	<b>ACTTCACTCG</b>	ACAGAGGCAA	850
CCCAGTGAGG	GTTCCAGCAG	CCGTGAAGAG	GAGGGGCCAA	GCACCTCTTG	900
TATCCTGGAG	TCCTTGTTCC	GAGCAGTAAT	CACTAAGAAG	GTGGCTGATT	950
TGGTTGGTTT	TCTGCTCCTC	<b>AAATATCGAG</b>	CCAGGGAGCC	AGTCACAAAG	1000
GCAGAAATGC	TGGAGAGTGT	CATCAAAAAT	TACAAGCACT	GTTTTCCTGA	1050
GATCTTCGGC	AAAGCCTCTG	<b>AGTCCTTGCA</b>	GCTGGTCTTT	GGCATTGACG	1100
TGAAGGAAGC	AGACCCCACC	GGCCACTCCT	ATGTCCTTGT	CACCTGCCTA	1150
GGTCTCTCCT	ATGATGGCCT	GCTGGGTGAT	<b>AATCAGATCA</b>	TGCCCAAGAC	1200
AGGCTTCCTG	ATAATTGTCC	TGGTCATGAT	TGCAATGGAG	GGCGGCCATG	1250
CTCCTGAGGA	GGAAATCTGG	GAGGAGCTGA	GTGTGATGGA	GGTGTATGAT	1300
GGGAGGGAGC	ACAGTGCCTA	TGGGGAGCCC	AGGAAGCTGC	TCACCCAAGA	1350
TTTGGTGCAG	GAAAAGTACC	TGGAGTACGG	CAGGTGCCGG	ACAGTGATCC	1400
CGCACGCTAT	GAGTTCCTGT	GGGGTCCAAG	GGCCCTCGCT	GAAACCAGCT	1450
ATGTGAAAGT	CCTTGAGTAT	GTGATCAAGG	TCAGTGCAAG	AGTTCGCTTT	1500
TTCTTCCCAT	CCCTGCGTGA	AGCAGCTTTG	AGAGAGGAGG	AAGAGGGAGT	1550
CTGAGCATGA	GTTGCAGCCA	AGGCCAGTGG	GAGGGGGACT	GGGCCAGTGC	1600
ACCTTCCAGG	GCCGCGTCCA	GCAGCTTCCC	CTGCCTCGTG	TGACATGAGG	1650
CCCATTCTTC	ACTCTGAAGA	GAGCGGTCAG	TGTTCTCAGT	AGTAGGTTTC	1700
TGTTCTATTG	GGTGACTTGG	AGATTTATCT	TTGTTCTCTT	TTGGAATTGT	1750
TCAAATGTTT	TTTTTTAAGG	GATGGTTGAA	TGAACTTCAG	CATCCAAGTT	1800
TATGAATGAC	AGCAGTCACA	CAGTTCTGTG	TATATAGTTT	AAGGGTAAGA	1850
GTCTTGTGTT	TTATTCAGAT	TGGGAAATCC	ATTCTATTTT	GTGAATTGGG	1900
ATAATAACAG	CAGTGGAATA	AGTACTTAGA	AATGTGAAAA	ATGAGCAGTA	1950
<b>AAATAGATGA</b>	GATAAAGAAC	TAAAGAAATT	AAGAGATAGT	CAATTCTTGC	2000
CTTATACCTC	AGTCTATTCT	GTAAAATTTT	TAAAGATATA	TGCATACCTG	2050
					•

GATTTCCTTG	GCTTCTTTGA	GAATGTAAGA	GAAATTAAAT	CTGAATAAAG	2100
AATTCTTCCT	GTTCACTGGC	TCTTTTCTTC	TCCATGCACT	GAGCATCTGC	2150
TTTTTGGAAG	GCCCTGGGTT	AGTAGTGGAG	ATGCTAAGGT	AAGCCAGACT	2200
CATACCCACC	CATAGGGTCG	TAGAGTCTAG	GAGCTGCAGT	CACGTAATCG	2250
AGGTGGCAAG	<b>ATGTCCTCTA</b>	<b>AAGATGTAGG</b>	GAAAAGTGAG	AGAGGGGTGA	2300
GGGTGTGGGG	CTCCGGGTGA	GAGTGGTGGA	GTGTCAATGC	CCTGAGCTGG	2350
GGCATTTTGG	GCTTTGGGAA	ACTGCAGTTC	CTTCTGGGGG	AGCTGATTGT	2400
<b>AATGATCTTG</b>	GGTGGATCC				2418

Felfe and Lynch 805 Third Avenue New York, NY 10022 imierry Boon 07/728,838 July'9, 1991

NOTICE TO COMPLY WITH REQUIREMENTS FOR PATENT APPLICATIONS CONTAINING NUCLEOTIDE SEQUENCE AND/OR AMINO ACID SEQUENCE DISCLOSURES This application contains sequence disclosures that are encompassed by the definitions for nucleotide and/or arnino acid sequences set forth in 37 CFR § 1.821(a)(1) and (a)(2). However, this application fails to comply with one or more of the requirements of 37 CFR §§ 1.821 through 1.825 as follows: 1. This application clearly fails to comply with the collective requirements of §§ 1.821 through 1.825. Applicant's attention is directed to these regulations, a copy of which is attached.

2. This application does not conform exclusively to the requirements of §§ 1.821 through 1.825. The non-conforming material should be deleted. § 1.821(b). 3. This application does not contain, as a separate part of the disclosure on paper copy, a "Sequence Listing." § 1.821(c). 4. This application does contain, as a separate part of the disclosure on paper copy, a "Sequence Listing." However, the "Sequence Listing" does not comply with the requirements of §§ 1.821 through 1.825 as follows: a. The sequence data does not comply with the symbol and format requirements of paragraphs (b) through (p) of § 1.822. Specifically: b. The "Sequence Listing" does not comply with the location and page requirements of paragraph (a) of § 1.823. L c. The "Sequence Listing" does not comply with the information requirements of paragraph (b) of § 1.823. Specifically: d. Other: 5. The description and/or claims of the patent application mention a sequence that is set forth in the "Sequence Listing" but reference is not properly made to the sequence by use of a sequence identifier as required by § 1.821(d). 6. A copy of the "Sequence Listing" in computer readable form has not been submitted as required by § 1.821(e). 7. A copy of the "Sequence Listing" in computer readable form has been submitted. However, the computer readable form does not comply with the requirements of § 1.824. Specifically: 8. A statement that the content of the paper and computer readable copies are the same has not been submitted as required by § 1.821(f). 9. The amendment to or replacement of the paper and/or computer readable copies of the "Sequence Listing" does not comply with the requirements of § 1.825(a) through (c). 10. The computer readable form that has been filed with this application has been found to be damaged and/or unreadable. Applicant must provide a substitute copy of the data in computer readable form accompanied by a statement that the substitute data is identical to that originally filed. § 1.825(d). Specifically: 11. Other: APPLICANT IS GIVEN ONE MONTH FROM THE DATE OF THIS LETTER WITHIN WHICH TO COMPLY WITH THE ABOVE REQUIREMENTS: Failure to comply with the above requirements will result in ABANDONMENT of the application under 37 CFR 1.821(g). Extensions of

time may be obtained by filing a petition accompanied by the extension fee under the provisions of 37 CFR § 1.136. Direct the response to, and any questions about, this notice to the undersigned. A

Examining Group

copy of this notice MUST be returned with your response.

Manager, Application Processing Division

Burnes